PATENT ASSIGNMENT COVER SHEET

Electronic Version v1.1 Stylesheet Version v1.2 EPAS ID: PAT7809364

SUBMISSION TYPE:	NEW ASSIGNMENT
NATURE OF CONVEYANCE:	ASSIGNMENT

CONVEYING PARTY DATA

Name	Execution Date
AKIO YAMAMOTO	01/24/2023
WEN LI	01/26/2023
HIROSHI OINUMA	01/27/2023
SHUNSUKE MIZUTANI	01/24/2023

RECEIVING PARTY DATA

Name:	HITACHI HIGH-TECH CORPORATION	
Street Address:	17-1, TORANOMON 1-CHOME, MINATO-KU	
City:	TOKYO	
State/Country:	JAPAN	
Postal Code:	105-6409	

PROPERTY NUMBERS Total: 1

Property Type	Number
Application Number:	17587935

CORRESPONDENCE DATA

Fax Number: (215)568-6499

Correspondence will be sent to the e-mail address first; if that is unsuccessful, it will be sent

using a fax number, if provided; if that is unsuccessful, it will be sent via US Mail.

Phone: 2155686400

Email: jchilson@vklaw.com, japan@vklaw.com

VOLPE KOENIG Correspondent Name:

30 SOUTH 17TH STREET, 18TH FLOOR Address Line 1: Address Line 4: PHILADELPHIA, PENNSYLVANIA 19103

ATTORNEY DOCKET NUMBER:	HITACHI5-342000991US01
NAME OF SUBMITTER:	GERALD B. HALT, JR.
SIGNATURE:	/Gerald B. Halt, Jr./
DATE SIGNED:	02/22/2023

Total Attachments: 2

source=HITACHI5-342000991US01_Assignment_EFS#page1.tif source=HITACHI5-342000991US01 Assignment EFS#page2.tif

> **PATENT REEL: 062769 FRAME: 0878**

507762229

ASSIGNMENT

(譲渡証)

As a below named inventor, I hereby declare that:

IN CONSIDERATION of the sum of One Dollar (\$1.00) or the equivalent thereof, and other good and valuable consideration paid to me citizen of Japan by HITACHI HIGH-TECH CORPORATION, a corporation organized under the laws of Japan,

located at 17-1, Toranomon 1-chome, Minato-ku, Tokyo 105-6409, Japan,

receipt of which is hereby acknowledged I do hereby sell and assign to said HITACHI HIGH-TECH CORPORATION, its successors and assigns, all my right, title and interest, in and for the United States of America, in and to

CHARGED PARTICLE BEAM DEVICE AND CHARGED PARTICLE BEAM DEVICE CALIBRATION METHOD

invented by me (if only one is named below) or us (if plural inventors are named below) and described in the application for United States Letters Patent therefor, executed on even date herewith, and all United States Letters Patent which may be granted therefor, and all divisions, continuations and extensions thereof, the said interest being the entire ownership of the said Letters Patent when granted,

to be held and enjoyed by said HITACHI HIGH-TECH CORPORATION,

its successors, assigns or other legal representatives, to the full end of term for which said Letters Patent may be granted as fully and entirely as the same would have been held and enjoyed by me or us if this assignment and sale had not been made;

And I hereby agree to sign and execute any further documents or instruments which may be necessary, lawful, and proper in the prosecution of the above-named application or in the preparation and prosecution of any continuing, continuation-in-part, substitute, divisional, renewal, reviewed or reissue applications or in any amendment, extension, or interference proceedings, or otherwise to secure the title thereto in said assignee;

And I do hereby authorize and request the Commissioner of Patents to issue said Letters Patent to said HITACHI HIGH-TECH CORPORATION.

Signed on the date(s) indicated aside our signatures:

	INVENTOR(S) (発明者フルネームサイン)	Date Signed (署名日)
1')	akio Yamamato (AKIO YAMAMOTO)	Jan. 24. 2023
2)	Wen (Wen LI)	Jan. 26. 2023
3)	Hiroshi Oinuma (Hiroshi OINUMA)	Jan. 27. 2023
4)	(Shunsuke MiZUTANI)	
5)		
6)		
7)		
8)		

PATENT REEL: 062769 FRAME: 0879

ASSIGNMENT

(譲渡証)

As a below named inventor, I hereby declare that:

IN CONSIDERATION of the sum of One Dollar (\$1.00) or the equivalent thereof, and other good and valuable consideration paid to me citizen of Japan by HITACHI HIGH-TECH CORPORATION, a corporation organized under the laws of Japan,

located at 17-1, Toranomon 1-chome, Minato-ku, Tokyo 105-6409, Japan,

receipt of which is hereby acknowledged I do hereby sell and assign to said HITACHI HIGH-TECH CORPORATION, its successors and assigns, all my right, title and interest, in and for the United States of America, in and to

CHARGED PARTICLE BEAM DEVICE AND CHARGED PARTICLE BEAM DEVICE CALIBRATION METHOD

invented by me (if only one is named below) or us (if plural inventors are named below) and described in the application for United States Letters Patent therefor, executed on even date herewith, and all United States Letters Patent which may be granted therefor, and all divisions, continuations and extensions thereof, the said interest being the entire ownership of the said Letters Patent when granted.

to be held and enjoyed by said HITACHI HIGH-TECH CORPORATION,

its successors, assigns or other legal representatives, to the full end of term for which said Letters Patent may be granted as fully and entirely as the same would have been held and enjoyed by me or us if this assignment and sale had not been made;

And I hereby agree to sign and execute any further documents or instruments which may be necessary, lawful, and proper in the prosecution of the above-named application or in the preparation and prosecution of any continuing, continuation-in-part, substitute, divisional, renewal, reviewed or reissue applications or in any amendment, extension, or interference proceedings, or otherwise to secure the title thereto in said assignee;

And I do hereby authorize and request the Commissioner of Patents to issue said Letters Patent to said HITACHI HIGH-TECH CORPORATION.

Signed on the date(s) indicated aside our signatures:

	INVENTOR(S) (発明者フルネームサイン)	Date Signed (署名日)	
1).	(Akio YAMAMOTO)		
2)	(Wen LI)		
3)	(Hiroshi OINUMA)		
4)	Shunsuke Mizutani (Shunsuke MIZUTANI)	Jan. 24, 2023	
5)			
6)			
7)			
8)			

PATENT REEL: 062769 FRAME: 0880

RECORDED: 02/22/2023